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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
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| 10/790,061 | 03/02/2004 | Koji Yui | 0425-1119P | 9824 |
| 2292 | 7590 | 12/01/2006 | EXAMINER | |
| BIRCH STEWART KOLASCH & BIRCH PO BOX 747 FALLS CHURCH, VA 22040-0747 | | | YOON, TAE H | |
| | | | ART UNIT | PAPER NUMBER |
| | | | 1714 | |

DATE MAILED: 12/01/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/790,061

Applicant(s)

YUI ET AL.

Examiner

Tae H. Yoon

Art Unit

1714

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-20 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s)/Mail Date. ____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) Paper No(s)/Mail Date ____ | 6) <input type="checkbox"/> Other: ____ |

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 9 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim is indefinite and confusing since "a vinyl monomer having a carboxyl group or a salt thereof" is recited twice.

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-6, 8, 11 and 13-20 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over EP 0 623 670.

EP teaches a micelle forming emulsion detergent composition comprising non-ionic surfactant, electrolyte salt and stabilizing hydrophilic polymer containing

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hydrophobic group in abstract and examples. The use of zeolite (aluminumsilicate, page 10, line 24) and alcohol (page 20, line 25) is also taught. Various electrolyte salts and amounts thereof are taught at page 11. Non-ionic surfactants having the instant HLB value and amounts thereof are taught at page 17, lines 43-58. The instant polyelectrolyte stabilizer copolymers having hydrophobic group and hydrophilic group are taught at pages 14-16. Carbonates of alkali metals such as potassium or sodium are taught at page 11, lines 55 and 58

Thus, the invention lacks novelty.

Claims 1-20 are rejected under 35 U.S.C. 103(a) as obvious over EP 0 623 670 in view of EP 1 162 255 or Takiguchi et al (US 7,105,477).

The instant invention further recites other copolymers and a mass ratio of comonomers over EP'670. However, the use of the instant copolymers as block or grafted polymeric dispersants in detergent compositions is well known as taught by EP'255 ([0028]-[0041]) and Takiguchi et al (col. 5 and 6).

Thus, it would have been obvious to one skilled in the art at the time of invention to modify amounts of comonomers in obtaining the copolymer of EP'670 since a broad teaching of copolymers encompasses various amounts of said comonomers, and further to utilize block or grafted polymeric dispersants of EP'255 or Takiguchi et al in EP'670 since EP'670 teaches employing a polymeric stabilizer for detergent compositions and since the use of the instant copolymers as block or grafted polymeric

dispersants in detergent compositions is well known as taught by EP'255 and Takiguchi et al absent showing otherwise.

Claims 1-8, 11, 13-17, 19 and 20 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Grifo et al (US 3,328,309).

Grifo et al teach the instant copolymer stabilized emulsion detergent composition in examples, and an emulsion of a non-ionic surfactant, an electrolyte salt and vinyl methyl ether-maleic anhydride copolymer is seen in example 1. Example 3 shows employing sodium silicate, and other copolymers are taught in bridging paragraph on cols. 4 and 5. The instant micelle forming surfactants are taught at col. 2, lines 43-47.

Thus, the invention lacks novelty.

Claims 1-8, 11-17, 19 and 20 are rejected under 35 U.S.C. 103(a) as obvious over Grifo et al (US 3,328,309).

The instant invention further recites a mass ratio of a copolymer over Grifo et al.


But, it would have been obvious to one skilled in the art at the time of invention to modify amounts of comonomers in obtaining the copolymer of Grifo et al since a broad teaching of copolymers encompasses various amounts if said comonomers absent showing otherwise.

EP 0 381 431 teach the use of non-ionic polymer and thus fails to teach the instant copolymer having a hydrophilic group. The abstract of US 5,776,882 teaches one phase (isotropic) detergent different from the instant two-phase system.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tae H. Yoon whose telephone number is (571) 272-1128. The examiner can normally be reached on Mon-Thu.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Vasu Jagannathan can be reached on (571) 272-1119. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.


Tae H Yoon
Primary Examiner
Art Unit 1714

THY/November 25, 2006